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What is claimed is:

1. An antisense compound 8 to 30 nucleobases in length targeted to a nucleic acid molecule encoding human
5 MAP kinase kinase 6, wherein said antisense compound specifically hybridizes with and inhibits the expression of human MAP kinase kinase 6.

2. The antisense compound of claim 1 which is an antisense oligonucleotide.

10 3. The antisense compound of claim 2 wherein the antisense oligonucleotide has a sequence comprising SEQ ID NO: 9, 10, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 29, 30, 31, 32, 33, 34, 35, 38, 39, 40, 41, 43, 44, 45, 46 or 47.

15 4. The antisense compound of claim 2 wherein the antisense oligonucleotide has a sequence comprising SEQ ID NO: 10, 15, 22, 25, 29, 32, 34, 35 or 39.

5. The antisense compound of claim 2 wherein the antisense oligonucleotide comprises at least one modified
20 internucleoside linkage.

6. The antisense compound of claim 5 wherein the modified internucleoside linkage is a phosphorothioate linkage.

7. The antisense compound of claim 2 wherein the
25 antisense oligonucleotide comprises at least one modified sugar moiety.

8. The antisense compound of claim 7 wherein the modified sugar moiety is a 2'-O-methoxyethyl sugar moiety.

9. The antisense compound of claim 2 wherein the
30 antisense oligonucleotide comprises at least one modified nucleobase.

10. The antisense compound of claim 9 wherein the modified nucleobase is a 5-methylcytosine.

11. The antisense compound of claim 2 wherein the
35 antisense oligonucleotide is a chimeric oligonucleotide.

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12. A composition comprising the antisense compound of claim 1 and a pharmaceutically acceptable carrier or diluent.

13. The composition of claim 12 further comprising a
5 colloidal dispersion system.

14. The composition of claim 12 wherein the antisense compound is an antisense oligonucleotide.

15. A method of inhibiting the expression of MAP kinase kinase 6 in human cells or tissues comprising
10 contacting said cells or tissues with the antisense compound of claim 1 so that expression of MAP kinase kinase 6 is inhibited.

16. A method of treating a human having a disease or condition associated with MAP kinase kinase 6 comprising
15 administering to said animal a therapeutically or prophylactically effective amount of the antisense compound of claim 1 so that expression of MAP kinase kinase 6 is inhibited.

17. The method of claim 16 wherein the disease or
20 condition is an inflammatory or autoimmune disease.

18. The method of claim 17 wherein said inflammatory or autoimmune disease is rheumatoid arthritis.

19. The method of claim 16 wherein the disease or condition is heart disease.